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APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
09/670,971	09/27/2000	Daniel J. Sherlock	99PS017/KE	5977

7590

06/23/2003

Rockwell Collins Inc  
Intellectual Property Department  
400 Collins Road NE MS 124 323  
Cedar Rapids, IA 52498

EXAMINER

NGUYEN, HAU H

ART UNIT

PAPER NUMBER

2676

DATE MAILED: 06/23/2003

6

Please find below and/or attached an Office communication concerning this application or proceeding.

# Office Action Summary

Application No.

09/670,971

Applicant(s)

SHERLOCK ET AL.

Examiner

Hau H Nguyen

Art Unit

2676

-- The MAILING DATE of this communication appears on the cover sheet with the correspondence address --

## Period for Reply

A SHORTENED STATUTORY PERIOD FOR REPLY IS SET TO EXPIRE 03 MONTH(S) FROM THE MAILING DATE OF THIS COMMUNICATION.

- Extensions of time may be available under the provisions of 37 CFR 1.136(a). In no event, however, may a reply be timely filed after SIX (6) MONTHS from the mailing date of this communication.
- If the period for reply specified above is less than thirty (30) days, a reply within the statutory minimum of thirty (30) days will be considered timely.
- If NO period for reply is specified above, the maximum statutory period will apply and will expire SIX (6) MONTHS from the mailing date of this communication.
- Failure to reply within the set or extended period for reply will, by statute, cause the application to become ABANDONED (35 U.S.C. § 133).
- Any reply received by the Office later than three months after the mailing date of this communication, even if timely filed, may reduce any earned patent term adjustment. See 37 CFR 1.704(b).

## Status

- 1) ☒ Responsive to communication(s) filed on 17 March 2003.
- 2a) ☐ This action is FINAL. 2b) ☒ This action is non-final.
- 3) ☐ Since this application is in condition for allowance except for formal matters, prosecution as to the merits is closed in accordance with the practice under *Ex parte Quayle*, 1935 C.D. 11, 453 O.G. 213.

## Disposition of Claims

- 4) ☒ Claim(s) 1-26 is/are pending in the application.
- 4a) Of the above claim(s) \_\_\_\_\_ is/are withdrawn from consideration.
- 5) ☒ Claim(s) 25 and 26 is/are allowed.
- 6) ☒ Claim(s) 1-5, 8-10, 13-15 and 18-22 is/are rejected.
- 7) ☐ Claim(s) 6, 7, 11, 12, 16, 17, 23 and 24 is/are objected to.
- 8) ☐ Claim(s) \_\_\_\_\_ are subject to restriction and/or election requirement.

## Application Papers

- 9) ☐ The specification is objected to by the Examiner.
- 10) ☐ The drawing(s) filed on \_\_\_\_\_ is/are: a) ☐ accepted or b) ☐ objected to by the Examiner.
- Applicant may not request that any objection to the drawing(s) be held in abeyance. See 37 CFR 1.85(a).
- 11) ☐ The proposed drawing correction filed on \_\_\_\_\_ is: a) ☐ approved b) ☐ disapproved by the Examiner.
- If approved, corrected drawings are required in reply to this Office action.
- 12) ☐ The oath or declaration is objected to by the Examiner.

## Priority under 35 U.S.C. §§ 119 and 120

- 13) ☐ Acknowledgment is made of a claim for foreign priority under 35 U.S.C. § 119(a)-(d) or (f).
- a) ☐ All b) ☐ Some \* c) ☐ None of:
- ☐ Certified copies of the priority documents have been received.
  - ☐ Certified copies of the priority documents have been received in Application No. \_\_\_\_\_.
  - ☐ Copies of the certified copies of the priority documents have been received in this National Stage application from the International Bureau (PCT Rule 17.2(a)).
- \* See the attached detailed Office action for a list of the certified copies not received.
- 14) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. § 119(e) (to a provisional application).
- a) ☐ The translation of the foreign language provisional application has been received.
- 15) ☐ Acknowledgment is made of a claim for domestic priority under 35 U.S.C. §§ 120 and/or 121.

## Attachment(s)

- 1) ☒ Notice of References Cited (PTO-892)
- 2) ☐ Notice of Draftsperson's Patent Drawing Review (PTO-948)
- 3) ☐ Information Disclosure Statement(s) (PTO-1449) Paper No(s) \_\_\_\_\_.
- 4) ☐ Interview Summary (PTO-413) Paper No(s). \_\_\_\_\_.
- 5) ☐ Notice of Informal Patent Application (PTO-152)
- 6) ☐ Other: \_\_\_\_\_.

## DETAILED ACTION

### *Claim Rejections - 35 USC § 102*

1. The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless –

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

2. Claims 1-2, 10, 19 are rejected under 35 U.S.C. 102(e) as being anticipated by Detlef et al. (U.S. Patent No. 6,243,568).

Referring to claims 1, 10, and 19, Detlef et al. teach a wireless communication system including a plurality of intercommunicating transceivers to send and receive messages of digitally encoded information (col. 4, lines 7-10). As shown in Fig. 4, Detlef et al. teach a static signal 44 superimposed upon the communicated information 32 presented in time period 36, in response to received message 30 received during time period 34. Static signal 44 is added to communicated information 32 during the entire time period 36 (col. 7, lines 39-45). Detlef et al. further teach when the signal quality estimate is greater than, or equal to, the first minimum quality level, the indicator, which is a static signal (col. 5, lines 51-55), is not activated; and when the signal quality estimate is less than the first minimum quality level, the indicator is activated, whereby the user is warned of a message quality below a specified standard (col. 5, lines 60-67). With reference to Fig. 6, Detlef et al. teach the information demodulated, or decoded, in response to received message 30 during time period 34 is not presented as

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communicated information 32 during time period 36. Rather, extrapolated information 48 is presented as communicated information during time period 36. During time period 36, received message 30 is properly recovered (col. 9, lines 23-27).

In regard to claim 2, as cited above, Detlef et al. teach the received messages are digitally encoded information, thus are discrete values.

***Claim Rejections - 35 USC § 103***

3. The following is a quotation of 35 U.S.C. 103(a) which forms the basis for all obviousness rejections set forth in this Office action:

(a) A patent may not be obtained though the invention is not identically disclosed or described as set forth in section 102 of this title, if the differences between the subject matter sought to be patented and the prior art are such that the subject matter as a whole would have been obvious at the time the invention was made to a person having ordinary skill in the art to which said subject matter pertains. Patentability shall not be negated by the manner in which the invention was made.

4. Claims 3-5, 8-9, 13-15, 18, 20-22 are rejected under 35 U.S.C. 103(a) as being unpatentable over Detlef et al. (U.S. Patent No. 6,243,568).

Referring to claims 3-4, 13-15, 20-22, although Detlef et al. do not using the electronic system comprising a commercial airline display unit comprising an LCD display unit, or a commercial airline tapping unit, Detlef et al do teach the communication system is a digital television signal broadcast to digital televisions, and the signal quality estimated in step a) is also responsive to the detection of the loss of sequential broadcast frames. The warning indicator in step b) is a snow-like visual degradation, whereby the user sees an intuitive warning that the received message quality is poor (col. 3, lines 66-67, and col. 4, lines 1-6). Therefore, it would have been obvious to utilize the electronic system in a commercial airline display unit comprising an LCD display unit in order to provide entertainment to airplane passengers.

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Referring to claims 5 and 18, with reference again to Fig. 4, Detlef et al. teach the indicator signal is a logic signal. As specified in the specification of the application (page 16), a nominal 28-volts signal indicates a logical value of "1" or "on" indication, it would have been a matter of design choice to use a 28-volts amplification circuit to indicate the logical value for "1" or "on", since applicant has not disclosed that a 28-volts amplification circuit solves any stated problem or is for any particular purpose and it appears that any logical voltage level including a 28-volts on indication would function equally well.

In regard to claims 8 and 9, as cited above, since the signal received are in digital encoded and modulated format (col. 6, lines 38-40), the logic value of the received signals should be unaltered. In addition, 5 volt deviation is the standard deviation for signals, it would have been a matter of design choice to use 5 volt deviation since applicant has not disclosed that a 5 volt deviation solves any stated problem or is for any particular purpose and it appears that other deviation voltage would function equally well.

5. Claims 6-7, 11-12, 16-17, 23-24 are objected to as being dependent upon a rejected base claim, but would be allowable if rewritten in independent form including all of the limitations of the base claim and any intervening claims.

#### ***Allowable Subject Matter***

6. Claims 25 and 26 are allowed.

#### ***Conclusion***

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7. Any inquiry concerning this communication or earlier communications from the examiner should be directed to Hau H. Nguyen whose telephone number is: 703-305-4104. The examiner can normally be reached on MON-FRI from 8:30-5:30.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Matthew Bella can be reached on 703-308-6829.

Any response to this action should be mailed to:

Commissioner of Patents and Trademarks

Washington, D. C. 20231

or faxed to:

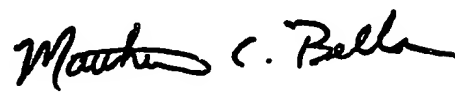
(703) 872-9314 (for Technology Center 2600 only)

Hand-delivered response should be brought to Crystal Park II, 2121 Crystal Drive, Arlington, VA, Sixth floor (Receptionist).

Any inquiry of a general nature or relating to the status of this application or proceeding should be directed to the Technology Center 2600 Customer Service Office whose telephone number is (703) 306-0377.

H. Nguyen

06/10/2003

  
MATTHEW C. BELLA  
SUPERVISORY PATENT EXAMINER  
TECHNOLOGY CENTER 2600